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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/603,721	06/24/2003	Takashi Imai	59,439 (70904)	3344
21874	7590	03/14/2008	EXAMINER	
EDWARDS ANGELL PALMER & DODGE LLP			BECKER, SHASHI KAMALA	
P.O. BOX 55874			ART UNIT	PAPER NUMBER
BOSTON, MA 02205			2179	
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**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

<b>Office Action Summary</b>	<b>Application No.</b>	<b>Applicant(s)</b>	
	10/603,721	IMAI ET AL.	
	<b>Examiner</b>	<b>Art Unit</b>	
	Shashi K. Becker	2179	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) Responsive to communication(s) filed on 12 December 2007.
- 2a) This action is **FINAL**.                            2b) This action is non-final.
- 3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) Claim(s) 1-4 and 6-18 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) Claim(s) \_\_\_\_\_ is/are allowed.
- 6) Claim(s) 1-4 and 6-18 is/are rejected.
- 7) Claim(s) \_\_\_\_\_ is/are objected to.
- 8) Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) The specification is objected to by the Examiner.
- 10) The drawing(s) filed on 24 June 2003 is/are: a) accepted or b) objected to by the Examiner. Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a). Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) All    b) Some \* c) None of:
  1. Certified copies of the priority documents have been received.
  2. Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- 1) Notice of References Cited (PTO-892)
- 2) Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) Information Disclosure Statement(s) (PTO/SB/08)  
Paper No(s)/Mail Date \_\_\_\_\_.
- 4) Interview Summary (PTO-413)  
Paper No(s)/Mail Date \_\_\_\_\_.
- 5) Notice of Informal Patent Application
- 6) Other: \_\_\_\_\_.

## DETAILED ACTION

### ***Claim Rejections - 35 USC § 103***

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of the various claims was commonly owned at the time any inventions covered therein were made absent any evidence to the contrary. Applicant is advised of the obligation under 37 CFR 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to consider the applicability of 35 U.S.C. 103(c) and potential 35 U.S.C. 102(e), (f) or (g) prior art under 35 U.S.C. 103(a).

1. Claims 1-4, 6, 9, 12-14, and 16-18 are rejected under 35 U.S.C. 103(a) as being unpatentable over Beaudet et al, (hereinafter Beaudet), US 2002/0048035 in view of Tezuka et al (hereinafter Tezuka) US Patent 5845078.

- In regards to claims 1, 16 and 17, Beaudet teaches a user interfacing display apparatus for use in an electronic apparatus including (i) detail setting key for detecting what a user selects, and for performing detail setting of a job as to what a user selects (page 4 and 5 paragraph [0041]), and (ii) control means, capable of performing a plurality of jobs respectively in accordance with desired

detail settings, for suspending a job that is being processed or a job that is standing by and performing another job, in accordance with an interruption instruction (page 1 paragraph [0008]), the user interfacing display apparatus comprising: an interruption key for detecting the interruption instruction, and transmitting the interruption instruction to the control means, the interruption key being capable of changing a display state thereof; a display section for displaying the desired detail settings (Figures 4D and 4E, page 4 and 5 paragraphs [0041] and [0042]); and display control means for (iii) popping up, when the details setting key that is associated with one of the detail settings of one of the plurality of jobs is selected, a detail item of that one of the detail settings on the display section and (iv) changing the display state of the interruption key, as a result of said selecting of said detail setting. However, Beaudet does not specifically teach changing the display state of the key, while keeping the key displayed on the display section.

Tezuka teaches a network integrated construction system, method of installing network connection machines, and method of setting network parameters.

Tezuka further teaches changing the display state of the key, while keeping the key displayed on the display section (column 64 line 53-column 65 line 25). It would have been obvious to one of ordinary skill in the art at the time of the invention to modify the method and apparatus of Beaudet to include the teachings of Tezuka in order to change display states of keys. One would have been motivated to make such a combination in order to set parameters of the

buttons/keys of the device to allow the user to distinguish between operation states when the key is on display (column 64 line 53-column 65 line 25).

- In regards to claim 2, Beaudet teaches the limitations above (see claims 1, 16, and 17 *supra*). Beaudet further teaches on performing the popping-up on the display section, the display control means transmits to the control means an instruction to invalidate the interruption instruction detected via the interruption key (Figures 4H to 4J, page 5 paragraph [0043]).
- In regards to claim 3, Beaudet teaches the limitations above (see claims 1, 16, and 17 *supra*). Beaudet further teaches on ending the popping-up after the detail setting is completed, the display control means transmits to the control means an instruction to validate the interruption instruction detected via the interruption key (page 4 paragraph [0041] and [0042]).
- In regards to claim 4, Beaudet teaches the limitations above (see claims 1, 16, and 17 *supra*). Beaudet further teaches the interruption key is a soft key that is displayed on the display section (page 4 paragraph [0041]).
- In regards to claim 6, Beaudet teaches the limitations above (see claims 1, 16, and 17 *supra*). Beaudet further teaches on performing the popping-up on the display section, the display control means hides at least part of the interruption key by performing the popping-up (Figures 4H to 4J, page 5 paragraph [0043]).
- In regards to claim 9, Beaudet teaches the limitations above (see claims 1, 16, and 17 *supra*). Beaudet further teaches on performing the popping-up on the display section, the display control means changes the display state of the

interruption key to an unavailability display state informing that interruption is unavailable (page 4 paragraph [0041] and [0042]).

- In regards to claim 12, Beaudet teaches the limitations above (see claims 1, 16, and 17 *supra*). Beaudet further teaches on ending the popping-up after the detail setting is completed, the display control means changes back the display state of the interruption key to a display state displayed before the popping-up is performed (page 4 paragraph [0041] and [0042]).
- In regards to claim 13, Beaudet teaches the limitations above (see claims 1, 16, and 17 *supra*). Beaudet further teaches warning means for warning the user, so that the display control means warns the user by using the warning means when detecting that the interruption key is selected while the popping-up is being performed on the display section (page 4 paragraph [0040]).
- In regards to claim 14, Beaudet teaches the limitations above (see claims 1, 16, and 17 *supra*). Beaudet further teaches the warning is performed by using a warning message (page 4 paragraph [0040]).
- In regards to claim 18, Beaudet teaches the limitations above (see claims 1, 16, and 17 *supra*). Beaudet further teaches being a digital photocopying machine (abstract).

2. Claims 7 and 8 are rejected under 35 U.S.C. 103(a) as being unpatentable over Beaudet and Tezuka, further in view of Sato et al (hereinafter Sato) JP 03175065.

- In regards to claim 7, Beaudet and Tezuka teach the limitations above (see claims 1, 16, and 17 *supra*). However Beaudet and Tezuka do not

specifically teach the interruption key is a hard key provided in the display section.

Sato teaches a method to easily interrupt/restart a receiving operation. Sato further teaches the interruption key is a hard key provided in the display section (abstract: constitution). It would have been obvious to one of ordinary skill in the art at the time of the invention to modify the method and apparatus of Beaudet and Tezuka to include the teachings of Sato in order to provide a hard interrupt key. One would have been motivated to make such a combination in order to provide a hard key to indicate when an interrupt key is available by flashing (abstract: constitution).

- In regards to claim 8, Beaudet and Tezuka teach the limitations above (see claims 1, 16, and 17 *supra*). However Beaudet and Tezuka do not specifically teach on performing the popping-up on the display section, the display control means switches over a lamp indicating whether the interruption key is available or unavailable.

Sato teaches a method to easily interrupt/restart a receiving operation. Sato further teaches on performing the popping-up on the display section, the display control means switches over a lamp indicating whether the interruption key is available or unavailable (abstract: constitution). It would have been obvious to one of ordinary skill in the art at the time of the invention to modify the method and apparatus of Beaudet and Tezuka to include the teachings of Sato in order to provide a hard interrupt key. One would have been motivated to make such a

combination in order to provide a hard key to indicate when an interrupt key is available by flashing (abstract: constitution).

3. Claims 10 and 11 are rejected under 35 U.S.C. 103(a) as being unpatentable over Beaudet and Tezuka, further in view of Hirayama, US 20020050996.

- In regards to claim 10, Beaudet and Tezuka teach the limitations above (see claims 1, 16, and 17 *supra*). However Beaudet does not specifically teach wherein the changing of the display state of the interruption key to the unavailability display state is performed by lighting a color thickness of the interruption key from a predetermined color thickness in which the interruption key has been displayed.

Hirayama teaches an information processing apparatus. Hirayama further teaches wherein, the changing of the display state of the interruption key to the unavailability display state is performed by lighting a color thickness of the interruption key from a predetermined color thickness in which the interruption key has been displayed (page 3 paragraph [0039]). It would have been obvious to one of ordinary skill in the art, at the time of the invention, to modify the apparatus and method of Beaudet and Tezuka to include the teachings of Hirayama in order to change the display state of the interruption key. One would have been motivated to make such a combination in order to better alert the user of the enablement or disablement of the interrupt key.

- In regards to claim 11, Beaudet and Tezuka teach the limitations above (see claims 1, 16, and 17 *supra*). However Beaudet and Tezuka do not

specifically teach wherein the changing of the display state of the interruption key to the unavailability display state is performed by using a dotted line.

Hirayama teaches an information processing apparatus. Hirayama further teaches the changing of the display state of the interruption key to the unavailability display state is performed by using a dotted line (page 3 paragraph [0039]). It would have been obvious to one of ordinary skill in the art, at the time of the invention, to modify the apparatus and method of Beaudet and Tezuka to include the teachings of Hirayama in order to change the display state of the interruption key. One would have been motivated to make such a combination in order to better alert the user of the enablement or disablement of the interrupt key.

4. Claim 15 is rejected under 35 U.S.C. 103(a) as being unpatentable over Beaudet and Tezuka, further in view of Sadakuni US Patent 6385412.

- In regards to claim 15, Beaudet and Tezuka teach the limitations above (see claims 1, 16, and 17 *supra*). However Beaudet does not specifically teach wherein the warning is performed by using a warning sound.

Sadakuni teaches an image forming apparatus. Sadakuni further teaches wherein the warning is performed by using a warning sound (column 8 lines 19-25). It would have been obvious to one of ordinary skill in the art, at the time of the invention, to modify the apparatus and method of Beaudet and Tezuka to include the teachings of Sadakuni in order to warn the user or via an auditory

warning. One would have been motivated to make such a combination in order warn the user of an interruption function via an auditory warning.

### ***Response to Arguments***

Applicant's arguments filed 12/12/07 have been fully considered but they are not persuasive.

Applicants argue that there is no indication in Beaudet of pop-up detail settings as soft keys. Examiner disagrees. Beaudet mentions that detail settings of a copy job are preformed via the operator control panel and keys can either be hard or soft on the panel, as is well known in the art (page 4 paragraph [0038]). Here on the details settings page (no figure shown), there would be detail items specified to the control settings of the job.

Applicant argues that Beaudet does not show detail settings in a pop-up display with an interrupt key still on display in a changed state. Examiner disagrees. Beaudet shows pop-up detail settings on the display and in combination with Tezuka, it would have been obvious to implement the interrupt key on the display with a changed display state in order to alert the user of the operation status. Therefore, the combination of Beaudet and Tezuka meet the limitations of claims 1, 16, and 17.

### ***Conclusion***

Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Shashi K. Becker whose telephone number is 571-272-8919. The examiner can normally be reached on Mon-Fri 8:30-5.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Weilun Lo can be reached on 571-272-4847. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

SKB

/Ba Huynh/

Primary Examiner, Art Unit 2179